

A1
cont 6.(Amended) An acid gas scrubbing method **according to claim 1**, wherein after said gas to be scrubbed is scrubbed, the scrubbed gas is supplied to a fuel cell via a hydrogen production step.

7.(Amended) An acid gas scrubbing method **according to claim 1**, wherein said gas to be scrubbed comprises a gas generated by incineration of combustibles.

11.(Amended) An acid gas scrubbing apparatus **according to claim 8**, further comprising a gas-liquid separator provided between said gas scrubber and said scrubbing liquid regenerator for separating gas components, to be scrubbed, accompanied by said gas scrubbing liquid;

A2 wherein said gas scrubbing liquid flows from said gas scrubber into said gas-liquid separator, and after gas-liquid separation, said gas scrubbing liquid flows in said scrubbing liquid regenerator.

12.(Amended) An acid gas scrubbing apparatus **according to claim 8**, wherein as said regenerating gas of said scrubbing liquid, oxygen-containing gas such as air or pure oxygen is used.

A3 14.(Amended) An acid gas scrubbing apparatus **according to claim 8**, wherein a gas-phase pressure in said gas scrubber is operated in the range of 80 to 110 kPa, and a gas-phase pressure in said scrubbing liquid regenerator is operated in the range of 110 to 200 kPa.

15.(Amended) An acid gas scrubbing apparatus **according to claim 8**, wherein a temperature of said circulating scrubbing liquid is in the range of 50 to 300°C.

16.(Amended) An acid gas scrubbing apparatus **according to claim 8**, wherein a temperature of said circulating scrubbing liquid is in the range of 50 to 200°C.

17.(Amended) An acid gas scrubbing apparatus **according to claim 8**, wherein a temperature of said circulating scrubbing liquid is in the range of 50 to 100°C.

20.(Amended) An acid gas scrubbing apparatus **according to claim 18**, further comprising gas-liquid separators provided between said first gas scrubbing section and said first scrubbing liquid regenerator and between said second gas scrubbing section and said second scrubbing liquid regenerator, respectively, for separating gas components, to be scrubbed, accompanied by said first and second gas scrubbing liquid.

21.(Amended) An acid gas scrubbing apparatus **according to claim 18**, wherein as said first regenerating gas, oxygen-containing gas such as air or pure oxygen is used.

22.(Amended) An acid gas scrubbing apparatus **according to claim 18**, further comprising gas-liquid separators provided downstream of said first and second scrubbing liquid regenerators in a scrubbing liquid path, respectively, for separating regenerating gas components accompanied by said first and second gas scrubbing liquid.

23.(Amended) An acid gas scrubbing apparatus **according to claim 18**, wherein a gas-phase pressure in said first and second gas scrubbing sections is operated in the range of 80 to 110 kPa, and a gas-phase pressure in said first and second scrubbing liquid regenerators is operated in the range of 110 to 200 kPa.

24.(Amended) An acid gas scrubbing apparatus **according to claim 18**, wherein the temperature of said first scrubbing liquid at the outlet of said first gas

scrubbing section is in the range of the boiling point to the boiling point minus 20°C, and the temperature of said first scrubbing liquid at the inlet of said first gas scrubbing section is in the range of the temperature of said first scrubbing liquid at the outlet of said first gas scrubbing section to said temperature of said first scrubbing liquid at the outlet of said first gas scrubbing section minus 20°C or in the range of the saturation temperature of steam in the gas to be scrubbed to said saturation temperature of steam minus 5°C.

25.(Amended) An acid gas scrubbing apparatus **according to claim 18**, wherein the temperature of said second scrubbing liquid at the outlet of said second gas scrubbing section is in the range of the temperature of said first scrubbing liquid at the inlet of said first gas scrubbing section to said temperature of said first scrubbing liquid at the inlet of said first gas scrubbing section minus 20°C, and the temperature of said second scrubbing liquid at the inlet of said second gas scrubbing section is lower than the temperature of said second scrubbing liquid at the outlet of said second gas scrubbing section by 5°C or more.

26.(Amended) An acid gas scrubbing apparatus **according to claim 18**, wherein a pH of said first scrubbing liquid in said first gas scrubbing section is in the range of 4 to 11, and a pH of said second scrubbing liquid in said second gas scrubbing section is in the range of 7 to 12.

27.(Amended) A gasification system of combustibles, characterized in that:
a gasification apparatus is provided to obtain a combustible gas from combustibles such as combustible wastes, biomass, or coal, a produced gas produced by said gasification apparatus is scrubbed by said acid gas scrubbing method **according to claim 1**, and a regenerator vent gas of said acid gas scrubbing apparatus is led to said gasification apparatus to be utilized as a gasifying agent for gasification.

A⁴
CNY

28.(Amended) A gasification system of combustibles, characterized in that:
a gasification apparatus is provided to obtain a combustible gas from combustibles such as combustible wastes, biomass, or coal, a produced gas produced by said gasification apparatus is cooled and scrubbed by said acid gas scrubbing method **according to claim 3**, and a first scrubbing liquid regenerator vent gas of said acid gas scrubbing apparatus is led to said gasification apparatus to be utilized as a gasifying agent for gasification.

29.(Amended) A gasification system of combustibles **according to claim 27**, wherein said gasification apparatus comprises a fluidized-bed gasification furnace whose bed temperature is operated in the range of 450 to 950°C.

A⁵

31.(Amended) An incineration system, characterized in that:
an incineration apparatus is provided to incinerate combustibles such as combustible wastes, combustion exhaust gas from said incineration apparatus is scrubbed by said acid gas scrubbing apparatus **according to claim 8**, and a regenerating gas of said acid gas scrubbing apparatus is led to said incineration apparatus to be utilized as a combustion oxidization gas.

Kindly add the following new claims:

A⁶

34.(NEW) An acid gas scrubbing method, characterized in that:
a combustible gas produced by gasifying combustibles in a gasification step is scrubbed by a scrubbing liquid to absorb acid gases in said combustible gas and recover heat possessed by said combustible gas with said scrubbing liquid, and when said scrubbing liquid is regenerated by bringing said scrubbing liquid after said scrubbing into contact with a regenerating gas, steam and heat are recovered from said scrubbing liquid

with said regenerating gas, and said regenerating gas which has recovered said steam and said heat is supplied to said gasification step and utilized in said gasification step.

35. (NEW) An acid gas scrubbing method **according to claim 34**, wherein said gasification step is performed by a fluidized-bed furnace.

36. (NEW) An acid gas scrubbing method **according to claim 34**, wherein said regenerating gas comprises oxygen-containing gas.

37. (NEW) A system for gasifying combustibles, comprising:

a gasification apparatus for producing a combustible gas by gasifying combustibles;

a gas scrubber for scrubbing said combustible gas produced in said gasification apparatus by a scrubbing liquid, and absorbing acid gases in said combustible gas and recovering heat possessed by said combustible gas with said scrubbing liquid; and

a scrubbing liquid regenerator for recovering steam and heat from said scrubbing liquid with a regenerating gas, when said scrubbing liquid is regenerated by bringing said scrubbing liquid after said scrubbing into contact with said regenerating gas;

wherein said regenerating gas which has recovered said steam and said heat by said scrubbing liquid regenerator is supplied to said gasification apparatus and utilized in said gasification apparatus.

38. (NEW) A system for gasifying combustibles **according to claim 37**, wherein said gasification apparatus comprises a fluidized-bed gasification furnace.

39. (NEW) A system for gasifying combustibles **according to claim 37**, wherein said regenerating gas comprises oxygen-containing gas.

40.(NEW) A gasification system of combustibles, characterized in that:

A^b
conv a gasification apparatus is provided to obtain a combustible gas from combustibles such as combustible wastes, biomass, or coal, a produced gas produced by said gasification apparatus is scrubbed by said acid gas scrubbing apparatus **according to claim 8**, and a regenerator vent gas of said acid gas scrubbing apparatus is led to said gasification apparatus to be utilized as a gasifying agent for gasification.
